

COMMONWEALTH OF VIRGINIA
STATE WATER CONTROL BOARD

FACT SHEET

ISSUANCE OF A GENERAL VPDES PERMIT
TO DISCHARGE TO STATE WATERS AND STATE
CERTIFICATION UNDER THE STATE WATER CONTROL LAW

The State Water Control Board (Board) has under consideration the issuance of a general VPDES watershed permit for total nitrogen and total phosphorus discharges and nutrient trading in the Chesapeake Bay watershed in Virginia.

Permit Number: VANxx

Name of Permittee: There are two categories of owners required to register for coverage under the general permit:

Every owner or operator of a facility authorized by a Virginia Pollutant Discharge Elimination System permit to discharge 100,000 gallons or more per day, or an equivalent load, directly into tidal waters, or 500,000 gallons or more per day, or an equivalent load, directly into nontidal waters, and

Any owner or operator of a facility authorized by a Virginia Pollutant Discharge Elimination System permit to discharge 40,000 gallons or more per day, or an equivalent load, directly into tidal or nontidal waters, at the time he makes application with the Department for a new discharge or expansion that is subject to an offset or technology-based requirement.

Facility Location: Commonwealth of Virginia (except for the Washington, DC - Blue Plains WWTP, which is eligible to exchange nutrient credits under this permit)

Receiving Waters: Surface waters within the Chesapeake Bay watershed.

On the basis of preliminary review and application of lawful standards and regulations, the board proposes to issue the general permit subject to certain conditions and has prepared a draft permit. The board has determined that this category of discharges is appropriately controlled under a general permit. The category of discharges to be included involves facilities with the same or similar need to control nutrient levels in their wastewater discharges. The draft general permit requires that all covered facilities meet standardized effluent limitations, conditions and monitoring requirements and allows the exchange of nitrogen and phosphorus credits between certain covered facilities.

Persons may comment in writing on the proposed issuance of the general permit from May 1, 2006 to June 30, 2006. Comments should be addressed to the contact person listed below. Comments shall include the name, address, and telephone number of the writer, and shall contain a complete, concise statement of the factual basis for comments. Only those comments received within this period will be considered by the board.

All pertinent information is on file and may be inspected, and arrangements made for copying by contacting Kyle Ivar Winter, P.E., at:

Virginia Department of Environmental Quality
P.O. Box 10009
Richmond, Virginia 23240
(804) 698-4182
email: kiwinter@deq.state.va.us

Public hearings to receive comments on the proposed general permit regulation will be held at: 2:00 p.m. on Tuesday, May 23, 2006 at the Preston Library, located on the post of Virginia Military Institute, Lexington; 2:00 p.m. on Wednesday, May 24, 2006 at the Department of Environmental Quality Northern Virginia Regional Office, 13901 Crown Court, Woodbridge; 2:00 p.m. on Tuesday, June 6, 2006 at the Department of Environmental Quality Tidewater Regional Office, 5636 Southern Blvd., Virginia Beach, and 3:00 p.m. on Monday, June 12, 2006 at the Department of Environmental Quality Piedmont Regional Office, 4949 A Cox Road, Glen Allen. Following the public hearing comment period, the board will make its determinations regarding the proposed issuance.

FACT SHEET

General VPDES watershed permit for total nitrogen and total phosphorus discharges and nutrient trading in the Chesapeake Bay watershed in Virginia

Page 2 of 4

Activities Covered by this Permit:

This general permit authorizes wastewater discharges of nitrogen and phosphorus from wastewater treatment facilities already authorized by a Virginia Pollutant Discharge Elimination System permit. Although no additional action will be required of many facilities across the Commonwealth, two categories of facilities are required by law to register for coverage under this general permit:

- Sewage treatment works authorized to discharge 100,000 gallons or more per day (or an equivalent load from industrial processes), directly into tidal waters, or 500,000 gallons or more per day (or an equivalent load from industrial processes) directly into nontidal waters. These facilities have already been identified during the development of the Chesapeake Bay Tributary Strategy; further, these facilities are listed in the Water Quality Management Plan (WQMP) regulation and have been assigned waste load allocations for nitrogen and phosphorus, to be regulated as annual mass loading limits in the general permit. These facilities are required by law to register for general permit coverage upon the effective date of the general permit.
- Sewage treatment works that, as a result of new construction or expansion, are proposed to discharge 40,000 gallons or more per day (or an equivalent load from industrial processes) directly into tidal or nontidal waters. These facilities are required to register for coverage under the general permit at the time of application with the Department for an individual VPDES permit, should that permit authorize new discharge or expansion that is subject to an offset or technology-based requirement. These facilities will not receive a waste load allocation for the increased (or new) discharges; expanding facilities will receive an annual load limit based on the facility design flow and nutrient removal technology that existed at the time application was made for the expanded discharge.

The general permit establishes annual effluent loading limits for nitrogen and phosphorus, and establishes the conditions by which credits (the difference in pounds between the facility's limit and the mass actually discharged) may be exchanged, or offsets (an alternate nutrient removal mechanism) may be purchased by existing facilities that have exceeded their allocation, or by new and expanded facilities not assigned a waste load allocation.

Effluent Limitations and Monitoring Requirements:

This permit supersedes the requirements of the registrants' individual VPDES permits pertaining to total nitrogen and total phosphorus except where site specific conditions necessitate more restrictive limits.

The Department maintains a registration list of facilities covered by the general permit. This list contains the load limits for the facilities; these limits are enforceable under the general permit.

Basis for Limitations and Monitoring Requirements:

The Chesapeake Bay Tributary Strategy established goals for the reduction of point source discharges of nitrogen and phosphorus from "significant" dischargers (sewage treatment works discharging 100,000 gallons or more per day to tidal waters, or an equivalent industrial load, or sewage treatment works discharging 500,000 gallons or more per day to nontidal waters, or an equivalent industrial load). The Water Quality Management Plan Regulation (9 VAC 25-720) codified the point source goals in the Tributary Strategy as waste load allocations for the respective dischargers.

Senate Bill 1275, known in the Code of Virginia as §62.1-44.19.12 et seq., requires that this general permit be developed and specifies the minimum contents of the general permit. The general permit incorporates the waste load allocations in the WQMP Regulation as effluent limitations (loading caps) for nitrogen and phosphorus.

Basis for Part I. Special Conditions

These special conditions apply to every registrant under this general permit.

A. Authorized activities

Basis: §62.1-44.19.14.C.5 of the Code of Virginia authorizes the discharge of total nitrogen and total phosphorus for facilities already holding an individual VPDES permit and outlines the registration requirements for existing, new and expanded facilities. Facilities holding an individual VPDES permit that are not required to register for general permit coverage are authorized to discharge under this general permit, but are not subject to the general permit requirements until registration is required (most likely by expansion).

B. Waste load allocations

FACT SHEET

General VPDES watershed permit for total nitrogen and total phosphorus discharges and nutrient trading in the Chesapeake Bay watershed in Virginia

Page 3 of 4

Basis: §62.1-44.19.14.C.1 of the Code of Virginia specifies that waste load allocations be assigned to each permitted facility (B.1.) and provides additional guidance for how those allocations may be aggregated for owners of multiple facilities (B.2.).

During development of the general permit, consolidation of multiple dischargers into one regional facility was considered to be functionally similar to the aggregation of waste load allocations, and conditions developed accordingly (B.3) to account for consolidation of facilities with, and without, waste load allocations.

Unless demonstrated by facilities on a case-by-case basis, the waste load allocations are considered total loads and not net loads (B.4.), and the entire allocation is considered to be bioavailable (B.5.).

C. Schedule of compliance

Basis: §62.1-44.19.14.C.2. of the Code of Virginia mandates a schedule requiring compliance with the combined waste load allocations for each tributary (C.1.) for nitrogen and phosphorus, as soon as possible taking into account (i) opportunities to minimize costs to the public or facility owners by phasing in the implementation of multiple projects; (ii) the availability of required services and skilled labor; (iii) the availability of funding from the Virginia Water Quality Improvement Fund as established in § 10.1-2128, the Virginia Water Facilities Revolving Fund as established in § 62.1-225, and other financing mechanisms; (iv) water quality conditions; and (v) other relevant factors. The final effluent limits effective dates for the respective parameters for the respective tributaries, serve as “not later than” dates for the compliance plans required by §62.1-44.19.14.C.3 of the Code of Virginia. This requires facilities to submit compliance plans (individually or through the Nutrient Credit Exchange Association) to the Department for approval within nine months of the effective date of the general permit. The registration list maintained by the Department serves to track the “not later than” dates in the tributary wide schedules of compliance, earlier dates for existing facilities based on their individual compliance plans, and new and expanded facilities based on the date that coverage under the general permit was extended. If conditions warrant, the Department shall reopen the general permit and modify the tributary wide compliance dates.

D. Annual update of tributary wide compliance plan

Basis: §62.1-44.19.14.C.3 of the Code of Virginia requires annual updates to the plan no later than February 1 of each year.

E. Monitoring and monthly reporting requirements

Basis: §62.1-44.19.14.C.4 of the Code of Virginia authorizes the Department to establish monitoring requirements as necessary to comply with the legislation. Permittees will submit monthly loading data on the same date as is required by their respective individual permits.

F. Annual submittal of discharge information and credits to be bought or sold by the permittee

Basis: §62.1-44.19.18.C of the Code of Virginia requires the submittal of the annual mass load and delivered total nitrogen and total phosphorus loads discharged as well as the number of total nitrogen and total phosphorus credits to be purchased or sold by the permittee.

G. Requirement to register

Basis: §62.1-44.19.14.C.5 of the Code of Virginia outlines the registration requirements for existing, new and expanded facilities.

H. Registration statement

Basis: §62.1-44.19.14.C.6 of the Code of Virginia requires that the Department have a procedure for efficiently modifying the lists of facilities covered by the General Permit.

I. Public Notice for registration statements proposing modifications or incorporations of new waste load allocations or delivery factors

Basis: §62.1-44.19.14.C.6 of the Code of Virginia requires that the Department have a procedure for efficiently incorporating new waste load allocations or delivery factors, including the opportunity for public notice and comment.

J.1. Definition of Compliance by permitted facility with individual waste load allocations

FACT SHEET

General VPDES watershed permit for total nitrogen and total phosphorus discharges and nutrient trading in the Chesapeake Bay watershed in Virginia

Page 4 of 4

Basis: §62.1-44.19.18.A of the Code of Virginia defines compliance as not exceeding the waste load allocations, or acquiring sufficient point source nitrogen or phosphorus credits to offset any exceedance of the waste load allocations, or acquiring credits through payment to the Water Quality Improvement Fund.

J.2. Credit acquisition from permitted facilities

Basis: §62.1-44.19.18.A.1 of the Code of Virginia outlines the conditions under which credits may be exchanged between point sources covered by the general permit.

J.3. Detail of payment to WQIF

Basis: §62.1-44.19.18.A.2. of the Code of Virginia outlines the procedures by which a permittee may purchase credits through payment to the Water Quality Improvement Fund.

J.4. Pretreatment program modifications by POTWs

Basis: §62.1-44.19.14.C.7. of the Code of Virginia authorizes DEQ to include “such other conditions as the Board deems necessary to carry out the provisions of this Chapter and Section 402 of the Clean Water Act”. During the development of the permit, several indirect dischargers requested the inclusion of this condition to allow the extension of market-based compliance flexibility to pretreatment programs, where the POTW imposed additional requirements as part of compliance with this general permit.

Basis for Part II conditions

These special conditions apply only to new and expanding facilities that are subject to this general permit.

A. Offset requirements for expanding and new facilities

Basis: §62.1-44.19.15 of the Code of Virginia requires expanding facilities to obtain offsets above and beyond their currently permitted allocation, and new facilities to obtain offsets for any total nitrogen and total phosphorus discharged. A.1. describes the types of facilities required to offset new and expanded discharges, and A.2. specifies the baselines from which the offset requirements are to be calculated.

B. Acquisition of waste load allocations to offset new or increased delivered Total Nitrogen and delivered Total Phosphorus loads

Basis: §62.1-44.19.15.B of the Code of Virginia prescribes the acquisition of point source nitrogen or phosphorus credits to offset the new or increased loads, acquisition of nonpoint source nitrogen or phosphorus credits, or acquiring credits through payment to the Water Quality Improvement Fund.

Part III

Basis: These conditions are applicable to all VPDES permits in accordance with 9 VAC 25-31-190. These conditions were modified to account for activities not applicable to this general permit (e.g., sludge management).

Administrative:

The general permit will have a fixed term of five (5) years. Every authorization to discharge under this general permit will expire at the same time and all authorizations to discharge will be renewed on the same date.

All persons required to be covered by this general permit must register with the department by filing a registration statement. For all new or expanded facilities that will begin activities after the effective date of this permit, the registration statement must be filed with the application for an individual VPDES permit.